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UNITED STATES PATENT AND TRADEMARK OFFICE

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BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES

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*Ex parte* MICHAEL FICCO

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Appeal 2008-1667  
Application 09/978,452<sup>1</sup>  
Technology Center 2600

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Decided: September 10, 2008

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Before KENNETH W. HAIRSTON, ROBERT E. NAPPI, and MARC S.  
HOFF, *Administrative Patent Judges*.

HOFF, *Administrative Patent Judge*.

DECISION ON APPEAL

STATEMENT OF CASE

Appellant appeals under 35 U.S.C. § 134 from a Final Rejection of claims 1-52 and 54-56. We have jurisdiction under 35 U.S.C. § 6(b).

We affirm-in-part.

Appellant's invention is a system and method for aircraft multimedia distribution. A multimedia server is provided within the aircraft, and a multimedia communications network is connected to the multimedia server.

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<sup>1</sup> Application filed October 17, 2001. The real party in interest is The DirecTV Group, Inc.

The multimedia server is configured to distribute, over the aircraft multimedia communications network, multimedia in-flight to a passenger for viewing, listening, and purchasing (Spec. 2). Pre-flight, the multimedia server is also connected to an airline web server located remotely from the aircraft.

Claims 1 and 55 are exemplary:

1. A system for aircraft multimedia distribution, comprising:  
a multimedia server provided within an aircraft of an airline; and  
a multimedia communications network within said aircraft coupled to said multimedia server; and  
wherein said multimedia server is configured to distribute, over said aircraft multimedia communications network, multimedia in-flight to a device of a passenger for purchasing by said passenger, the multimedia being selected pre-flight via a web server in communication with the multimedia server.

55. A method for receiving multimedia, comprising:  
accessing a multimedia server over a communications network within an aircraft; displaying a menu of options corresponding to a plurality of multimedia;  
selecting, pre-flight, one of the options for purchase of a corresponding one of the plurality of multimedia via a web server coupled to the multimedia server; and  
receiving the corresponding one of the plurality of multimedia over the communications network.

The prior art is relied upon by the Examiner in rejecting the claims on appeal is:

Ahmad	US 5,565,908	Oct. 15, 1996
Humpleman	US 5,579,308	Nov. 26, 1996
Dedrick	US 5,724,521	Mar. 3, 1998
Booth	US 5,835,127	Nov. 10, 1998
Neel	US 5,838,314	Nov. 17, 1998
McCarten	US 5,595,596	Sep. 28, 1999
Rosin	US 6,028,600	Feb. 22, 2000

Wright	US 6,047,165	Apr. 4, 2000
Galipeau	US 6,249,913 B1	Jun. 19, 2001
Volpe	US 2001/0032028 A1	Oct. 18, 2001
Schwab	US 6,353,699 B1	Mar. 5, 2002

Claims 1-5, 7, 8, 11, 13-15, 27-31, 33, 34, 37, 39-41, and 54-56 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright and Booth.

Claims 6 and 32 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Humpleman.

Claims 9 and 35 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Schwab.

Claims 10 and 36 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Ahmad.

Claims 12 and 38 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Rosin.

Claims 16 and 42 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and McCarten.

Claims 17 and 43 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, McCarten, and Ahmad.

Claims 18-21 and 44-47 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Volpe.

Claims 22-24 and 48-50 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, and Neel.

Claims 25, 26, 51, and 52 stand rejected under 35 U.S.C. § 103 as being unpatentable over Galipeau in view of Wright, Booth, Neel, and Dedrick.

Appellant contends that the Examiner erred in rejecting the claims because the prior art does not teach or fairly suggest the claim limitation of multimedia selection pre-flight via a web server in communication with the multimedia server (App. Br. 6).

Rather than repeat the arguments of Appellant or the Examiner, we make reference to the Brief (filed January 9, 2007), the Reply Brief (filed July 10, 2007), and the Answer (mailed May 15, 2007) for their respective details.

#### ISSUE

The principal issue in the appeal before us is whether the Examiner erred in holding that Galipeau in combination with Wright and Booth teaches multimedia being selected pre-flight via a web server in communication with the multimedia server, as required by the independent claims.

#### FINDINGS OF FACT

The following Findings of Fact (FF) are shown by a preponderance of the evidence.

##### *The Invention*

1. According to Appellant, he has invented a system and method for aircraft multimedia distribution. A multimedia server is provided within the aircraft, and a multimedia communications network is connected to the multimedia server. The multimedia server is configured to distribute, over

the aircraft multimedia communications network, multimedia in-flight to a passenger for viewing, listening, and purchasing (Spec. 2). Pre-flight, the multimedia server is also connected to an airline web server (Spec. 7).

*Galipeau*

2. Galipeau teaches a system for managing the distribution of power and data to a plurality of users on board a commercial aircraft (col. 1, ll. 17-19).

*Wright*

3. Wright teaches a wireless ground data link through which flight performance data provided by airborne data acquisition equipment is stored, compressed, encrypted, and downloaded to an airport-resident ground subsystem (col. 2, ll. 13-16).

4. Wright teaches uploading, from a ground data link (GDL) at an airport to the waiting aircraft, of digitized video and audio files that may be employed as part of a passenger service/entertainment package (col. 7, ll. 16-23).

5. Wright teaches that the data terminal equipment (DTE) of GDL segment 101 “stores and distributes information uploaded to the aircraft ... in preparation for the next flight or series of flights” (col. 7, ll. 9-15).

*Booth*

6. Booth teaches an “integrated electronic system and method for providing telephony, interactive entertainment and other amenities on a commercial vehicle” (col. 2, ll. 22-24).

*Humpleman*

7. Humpleman teaches a method and apparatus for connecting terminals to a network, in which a passive hub and direct circuit crossbar arrangement are provided (col. 2, ll. 4-7).

*Schwab*

8. Schwab teaches “methods and apparatus whereby audio and video programs from remote sites, including such programs recorded in different formats, may be compiled into a final program or a master and duplicated to produce an audio/video periodical or other applications” (col. 1, ll. 13-18).

*Ahmad*

9. Ahmad teaches “a system and method for providing information, management, and entertainment services to a user” (col. 2, ll. 10-12).

*Rosin*

10. Rosin teaches “an internet on-demand system for television presenting internet content and traditional television programming as part of a single coherent interface” (col. 2, ll. 46-48).

*McCarten*

11. McCarten teaches “an airline-based distributed processing video game and communications system associated with substantially every seat in an airplane” (col. 1, ll. 7-9).

*Volpe*

12. Volpe teaches generating a pre-recorded audio performance on the basis of event-specific information and selected entertainment is provided in a format suitable for broadcast at the event site (para. [0006]).

*Neel*

13. Neel teaches “an interactive video services system for enabling interactive advertisements and advertiser pay-per-view and video-on-demand video programming” (col. 1, ll. 6-9).

*Dedrick*

14. Dedrick teaches “method and apparatus for providing electronic advertisements to end users in a consumer best-fit pricing manner” (col. 1, ll. 63-65).

PRINCIPLES OF LAW

“Section 103 forbids issuance of a patent when ‘the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.’” *KSR Int’l Co. v. Teleflex Inc.*, 127 S.Ct. 1727, 1734 (2007). The question of obviousness is resolved on the basis of underlying factual determinations including (1) the scope and content of the prior art, (2) any differences between the claimed subject matter and the prior art, (3) the level of skill in the art, and (4) where in evidence, so-called secondary considerations. *Graham v. John Deere Co.*, 383 U.S. 1, 17-18 (1966). *See also KSR*, 127 S.Ct. at 1734 (“While the sequence of these questions might



be reordered in any particular case, the [*Graham*] factors continue to define the inquiry that controls.”)

In *KSR*, the Supreme Court emphasized “the need for caution in granting a patent based on the combination of elements found in the prior art,” *id.* at 1739, and discussed circumstances in which a patent might be determined to be obvious. In particular, the Supreme Court emphasized that “the principles laid down in *Graham* reaffirmed the ‘functional approach’ of *Hotchkiss*, 11 How. 248.” *KSR*, 127 S.Ct. at 1739 (citing *Graham v. John Deere Co.*, 383 U.S. 1, 12 (1966) (emphasis added)), and reaffirmed principles based on its precedent that “[t]he combination of familiar elements according to known methods is likely to be obvious when it does no more than yield predictable results.” *Id.* The Court explained:

When a work is available in one form of endeavor, design incentives and other market forces can prompt variations of it, either in the same field or a different one. If a person of ordinary skill can implement a predictable variation, § 103 likely bars its patentability. For the same reason, if a technique has been used to improve one device, and a person of ordinary skill in the art would recognize that it would improve similar devices in the same way, using the technique is obvious unless its actual application is beyond his or her skill.

*Id.* at 1740. The operative question in this “functional approach” is thus “whether the improvement is more than the predictable use of prior art elements according to their established functions.” *Id.*

## ANALYSIS

*Claims 1-5, 7, 8, 11, 13-15, 27-31, 33, 34, 37, 39-41, and 54*

Appellant argues that the none of the applied references, considered singly or in combination, disclose selecting multimedia pre-flight via a web server, as independent claims 1, 27, and 54 require (App. Br. 6). Specifically, Appellant analyzes the Galipeau and Wright references combined (along with Booth) to reject claim 1 and stresses that neither reference discloses or suggests “the notion of enabling a passenger to make a pre-flight selection of multimedia, regardless of whether it was uploaded into the aircraft pre-flight” (App. Br. 8, emphasis original).

We are not persuaded by Appellant’s argument. The Examiner points out that the claim language does not specify who or what does the “selecting” of multimedia pre-flight (Ans. 22). The Examiner applies Wright, which contains a teaching of uploading, from a ground data link (GDL) at an airport to the waiting aircraft, of digitized video and audio files that may be employed as part of a passenger service/entertainment package (FF 4). In the Examiner’s view, the claim may be interpreted such that airline personnel are the people doing the “selecting” of multimedia pre-flight, in order to provide customers with a menu of multimedia selections from which to choose while in the aircraft (Ans. 22).

Appellant urges that we are still required to interpret the claim such that the airline passenger is the selecting agent, because the claims specify that the passenger purchases the multimedia in the clause immediately preceding the “selecting” recitation (Reply Br. 3). We disagree with Appellant that such an interpretation is the “only reasonable” one (*id.*). First,

the claim recites that the multimedia server is “configured to distribute ... multimedia in-flight to a device of a passenger *for purchasing by said passenger*” (emphasis added), which suggests that purchasing does not occur until the aircraft is in-flight. That a passenger should have to select a movie or other entertainment pre-flight but not be able to engage in a purchase transaction at that time, but must instead wait until he or she is in flight before actually purchasing the selected entertainment, seems cumbersome at best. Second, the fact that a passenger purchases his or her desired multimedia in-flight does not preclude an interpretation under which airline personnel also select, pre-flight, an array of offerings from which passengers may select once en route to their destination.

Finally, Appellant argues that it would be speculative to conclude that Wright describes a system wherein a selection of multimedia is being performed pre-flight, because the system in Wright that uploads passenger entertainment also collects and stores flight performance data generated on board the aircraft *during* flight. Therefore, according to Appellant, “there is nothing to suggest that the further storing and distributing of information is performed at any time other than during flight” (Reply Br. 4, emphasis original). We disagree with this interpretation, because as Appellant points out, Wright teaches that the data terminal equipment (DTE) of GDL segment 101 “stores and distributes information uploaded to the aircraft ... in preparation for the next flight or series of flights” (FF 5). Something occurring “in preparation for the next flight” inevitably occurs “pre-flight” with respect to that next flight. We therefore find no teaching in Wright that precludes its use to teach that digitized audio and video (multimedia) are

uploaded from the data terminal equipment of the GDL segment to the aircraft pre-flight, as the claims require.

We therefore find no error in the rejections of independent claims 1, 27, 54, nor in the rejections of claims 2-5, 7, 8, 11, 13-15, 28-31, 33, 34, 37, and 39-41 not separately argued, under 35 U.S.C. § 103.

*Claims 6 and 32*

The Examiner has separately rejected dependent claims 6 and 32, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Humpleman to teach the limitations of claims 6 and 32, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 6 and 32 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 9 and 35*

The Examiner has separately rejected dependent claims 9 and 35, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Schwab to teach the limitations of claims 9 and 35, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to

independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 9 and 35 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 10 and 36*

The Examiner has separately rejected dependent claims 10 and 36, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Ahmad to teach the limitations of claims 10 and 36, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 10 and 36 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 12 and 38*

The Examiner has separately rejected dependent claims 12 and 38, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Rosin to teach the limitations of claims 12 and 38, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these

rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 12 and 38 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 16 and 42*

The Examiner has separately rejected dependent claims 16 and 42, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of McCarten to teach the limitations of claims 16 and 42, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 16 and 42 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 17 and 43*

The Examiner has separately rejected dependent claims 17 and 43, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of McCarten and Ahmad to teach the limitations of claims 17 and 43, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to

claim 1, which (as discussed *supra*) are not persuasive of error.

Accordingly, we sustain the Examiner's rejection of claims 17 and 43 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 18-21 and 44-47*

The Examiner has separately rejected dependent claims 18-21 and 44-47, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Volpe to teach the limitations of claims 18-21 and 44-47, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejections of claims 18-21 and 44-47 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 22-24 and 48-50*

The Examiner has separately rejected dependent claims 22-24 and 48-50, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Neel to teach the limitations of claims 22-24 and 48-50, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the

Examiner's rejection of claims 22-24 and 48-50 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 25, 26, 51, and 52*

The Examiner has separately rejected dependent claims 25, 26, 51, and 52, relying upon the teachings of Galipeau, Wright, and Booth to teach the limitations of independent claims 1 and 27 and the additional teachings of Neel and Dedrick to teach the limitations of claims 25, 26, 51, and 52, dependent upon claims 1 and 27 respectively. As discussed *supra*, Appellant presents one argument directed to all claims on appeal by discussing the rejection as it applies to independent claim 1. Thus, Appellant's arguments with respect to these rejections are the same as presented with respect to claim 1, which (as discussed *supra*) are not persuasive of error. Accordingly, we sustain the Examiner's rejection of claims 25, 26, 51, and 52 under 35 U.S.C. § 103(a) for the reasons discussed above with respect to claim 1.

*Claims 55 and 56*

We select claim 55 as representative of this group, pursuant to our authority under 37 C.F.R. § 41.37(c)(1)(vii).

Claim 55 recites "selecting, pre-flight, one of the options for purchase of a corresponding one of a plurality of multimedia via a web server coupled to the multimedia server." Unlike the language of independent claims 1, 27, and 54, the language of claim 55 is not susceptible to the interpretation that airline personnel select an array of multimedia offerings to be presented to passengers, as we discussed with respect to claim 1, *supra*. Because claim 55 calls for the selection of one available option, and specifies that it is for



purchase, the only reasonable interpretation of claim 55 is that a paying passenger, and not an agent of the airline, is the individual doing the selecting. We agree with Appellant that the applied references do not teach or fairly suggest this limitation.

Accordingly, we find error in the Examiner's rejection of claim 55, as well as claim 56 dependent therefrom, under 35 U.S.C. § 103.

#### CONCLUSION OF LAW

We conclude that Appellant has shown that the Examiner erred in rejecting claims 55 and 56 under 35 U.S.C. § 103. We further conclude that Appellant has not shown that the Examiner erred in rejecting claims 1-52 and 54 under 35 U.S.C. § 103.

#### DECISION

The Examiner's rejection of claims 1-52 and 54 is affirmed. The Examiner's rejection of claims 55 and 56 is reversed.

No time period for taking any subsequent action in connection with this appeal may be extended under 37 C.F.R. § 1.136(a)(1)(iv).

Appeal 2008-1667  
Application 09/978,452

AFFIRMED-IN-PART

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